PROJECT TITLE

: BIOTECHNOLOGY

PERIOD COVERED

: FEBRUARY - MARCH 1982

WRITTEN BY

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NATURALLY OCCURRING DENITRIFICATION

Two strains were isolated from the freeze-dryed culture ATCC 1. The culture was able to be maintained on agar slants and was sent out for identification. In each of two lyophilisates, one of which had been produced in April 1981 and the other in January 1982, the 2 strains could be found.

ALTERNATIVE STRAIN FOR LEAR

<u>Candida Berthetii</u> CBS 5452 was found to denitrate Burley strip extracts in a more efficient way than <u>Candida utilis</u> NCYC 707. Up till now with a 1 : 15 extract (Burley strip : water) a dilution rate of $0.26~hr^{-1}$ has been achieved. Lactic acid was used for maintaining the pH and glucose was added at a level of 26 g per 1 g Nitrogen (N-NH₃ + N - NO₃). The maximum dilution rate will be determined. Most probably it is situated between 0.3 and 0.35 hr⁻¹.

Up till now with a 1 : 10 extract (Burley strip : water) a dilution rate of 0.15 hr $^{-1}$ has been achieved. This value is twice as high as those obtained with <u>Candida utilis NCYC 707</u>. It is certainly possible to speed up this dilution rate. Its maximal value is presently being determined.

J. Ren

JBE/jig/MARCH 22, 1982

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